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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/765,538	01/27/2004	Michael Jude Iosue	ET 98-41 D2	1649
29306 7	590 08/20/2004		EXAMINER	
	ER & ASSOCIATES	DONG, DALEI		
P. O. BOX 803302 DALLAS, TX 75380-3302			ART UNIT	PAPER NUMBER
,			2879	

DATE MAILED: 08/20/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No. Applicant(s)					
	10/765,538	IOSUE, MICHAEL JUDE				
Office Action Summary	Examiner	Art Unit)			
	Dalei Dong	2879	Pr			
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with the c	orrespondence ad	ldress			
A SHORTENED STATUTORY PERIOD FOR REPL THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a repl If NO period for reply is specified above, the maximum statutory period - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailin earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be timely within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	nely filed s will be considered timel the mailing date of this co D (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 27 J	anuary 2004.					
2a) This action is FINAL . 2b) ☐ This	s action is non-final.					
	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims			-			
4) ☐ Claim(s) 16-19 and 27-29 is/are pending in the 4a) Of the above claim(s) is/are withdra 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 16-19 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) 27-29 are subject to restriction and/o	wn from consideration.					
9) The specification is objected to by the Examine	er.					
10)⊠ The drawing(s) filed on <u>27 January 2004</u> is/are: a)⊠ accepted or b)□ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex	• • • • • • • • • • • • • • • • • • • •		• •			
Priority under 35 U.S.C. § 119	•					
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority document 2. Certified copies of the priority document 3. Copies of the certified copies of the priority application from the International Burea * See the attached detailed Office action for a list	ts have been received. ts have been received in Applicati rity documents have been receive u (PCT Rule 17.2(a)).	on No ed in this National	Stage			
Attachment(s)						
1) Motice of References Cited (PTO-892) 2) Motice of Draftsperson's Patent Drawing Review (PTO-948)	4)					
3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date			O-152)			

DETAILED ACTION

Election/Restrictions

During a telephone conversation with Thomas F. Marsteller Jr. on August 12, 2004 a provisional election was made without traverse to prosecute the invention of a method of making an image intensifier tube, claims 16-19. Affirmation of this election must be made by applicant in replying to this Office action. Claims 27-29 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

This application contains claims directed to the following patentably distinct species of the claimed invention:

Specie I Claims 16-19;

Specie II Claims 27-29.

Applicant is required under 35 U.S.C. 121 to elect a single disclosed species for prosecution on the merits to which the claims shall be restricted if no generic claim is finally held to be allowable. Currently, there is no generic.

Applicant is advised that a reply to this requirement must include an identification of the species that is elected consonant with this requirement, and a listing of all claims readable thereon, including any claims subsequently added. An argument that a claim is allowable or that all claims are generic is considered nonresponsive unless accompanied by an election.

Upon the allowance of a generic claim, applicant will be entitled to consideration of claims to additional species which are written in dependent form or otherwise include

all the limitations of an allowed generic claim as provided by 37 CFR 1.141. If claims are added after the election, applicant must indicate which are readable upon the elected species. MPEP § 809.02(a).

Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

Claim Rejections - 35 USC § 102

- 2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:
 - A person shall be entitled to a patent unless –
 - (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 3. Claims 16 and 19 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 5,493,111 to Wheeler.

Regarding to claim 16, Wheeler discloses in Figures 1-4, a method of making an image intensifier tube (10), said method including the steps of: providing an annular tube body (12 and 50); providing a microchannel plate (20) disposed within said tube body (12 and 50); providing an electrical contact structure (90) between said tube body (12 and 50)

and said microchannel plate (20); providing a yieldably deformable and axially-variable sealing structure (52') sealingly uniting the tube body (12 and 50) with a window member (16), said window member (16) carrying a photocathode (18) and yielding said axially-variable sealing structure (52') while maintaining a selected fine-dimension spacing between the photocathode and microchannel plate.

Regarding to claim 19, Wheeler discloses in Figures 1-4, the step of providing yieldably deformable electrical contact structure (90) between said tube body (12 and 50) and the said microchannel plate (20).

Claim Rejections - 35 USC § 103

- 4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 5. Claims 17 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 5,493,111 to Wheeler in view of U.S. Patent No. 5,338,927 to de Groot.

Regarding to claim 17, Wheeler discloses in Figures 1-4, a method of making an image intensifier tube (10), said method including the steps of: providing an annular tube body (12 and 50); providing a microchannel plate (20) disposed within said tube body (12 and 50); providing an electrical contact structure (90) between said tube body (12 and 50)

and said microchannel plate (20); providing a yieldably deformable and axially-variable sealing structure (52') sealingly uniting the tube body (12 and 50) with a window member (16), said window member (16) carrying a photocathode (18) and yielding said axially-variable sealing structure (52') while maintaining a selected fine-dimension spacing between the photocathode and microchannel plate.

However, Wheeler does not disclose forming fine-dimension spacing structure extending axially between said photocathode and said microchannel plate. de Groot teaches in Figure 2, a fine-dimension spacing structure (25) extending axially between said photocathode (6) and said microchannel plate (7) (column 4, lines 51-57) for the purpose of preventing any change in the distance between photocathode and the microchannel plate during the operating lifetime of the image tube.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to have utilize the fine-dimension spacing structure of de Groot for the image intensifier tube of Wheeler in order to prevent changes in the distance between the photocathode and the microchannel and thus maintain a precise distance between the photocathode and the microchannel plate during the operating lifetime of the image intensifier tube.

Regarding to claim 18, Wheeler in view of de Groot discloses the claimed invention except for the fine-dimension spacing structure is formed integrally with the photocathode. It would have been obvious to one having ordinary skill in the art at the time the invention was made to have made the fine-dimension spacing structure integral

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with the photocathode, since it has been held that forming in one piece an article which has formerly been formed in two pieces and put together involves only routine skill in the art. *Howard v. Detroit Stove Works*, 150 U.S. 164 (1893).

Conclusion

6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

The following prior art are cited to further show the state of the art of method of making an image intensifier tube.

- U.S. Patent No. 5,319,189 to Beauvais.
- U.S. Patent No. 5,514,928 to Niewold.
- U.S. Patent No. 5,581,151 to Wheeler.
- U.S. Patent No. 5,697,826 to Kim.
- U.S. Patent No. 6,066,020 to Devoe.
- U.S. Patent No. 6,198,090 to Iosue.
- U.S. Patent No. 6,483,231 to Iosue.
- U.S. Patent No. 6,724,131 to Iosue.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dalei Dong whose telephone number is (571)272-2370. The examiner can normally be reached on 8 A.M. to 5 P.M..

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nimeshkumar Patel can be reached on (571)272-2457. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

D.D. August 13, 2004

> Joseph Williams Primary Examiner Art Unit 2879